(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization International Bureau





(43) International Publication Date 30 September 2004 (30.09.2004)

PCT

(10) International Publication Number WO 2004/082674 A1

- (51) International Patent Classification?: A61K 31/205, A23L 1/305
- (21) International Application Number:
- (22) International Filing Date: 22 March 2004 (22.03.2004)
- (25) Filing Language:

English

PCT/GB2004/001256

(26) Publication Language:

English

(30) Priority Data: 0306394.8

20 March 2003 (20.03.2003) GB

- (71) Applicants (for all designated States except US): THE UNIVERSITY OF NOTTINGHAM [GB/GB]; University Park, Nottingham NG7 2RD (GB). LONZA SALES LTD [CH/CH]; Munchsteinerstrasse 38, CH-4002 Basel (CH).
- (72) Inventors; and
- (75) Inventors/Applicants (for US only): GREENHAFF, Paul, Leonard [GB/GB]; The University of Nottingham, University Park, Nottingham NG7 2RD (GB). CONSTANTIN, Teodosiu, Dumitru [SE/GB]; The University of Nottingham, University Park, Nottingham NG7 2RD (GB).

- (74) Agent: LOCK, Howard, John; Swindell & Pearson, 48 Friar Gate, Derby DE1 1GY (GB).
- (81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.
- (84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

with international search report

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: CARNITINE RETENTION

(57) Abstract: A composition for influencing carnitine retention in biological tissue is disclosed. The composition comprises a carnitine substance and an agent to increase sodium potassium ATPase pump activity in the tissue, and/or to increase the activity of a carnitine transport protein, and/or to increase blood/plasma insulin concentration.

